# Notice of Allowability

Application No.	Applicant(s)	
09/612,522	SUZUKI, KAZUHIKO	
Examiner	Art Unit	
Michael B. Holmes	2129	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address-All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included
herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. THIS
NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS. This application is subject to withdrawal from issue at the initiative
of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

- This communication is responsive to 05/26/2006.
- The allowed claim(s) is/are 34-47,49-73,75-99,101-126 and 128-137.
- Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
  - a) All b) Some\* c) None of the:
    - 1. \( \sum \) Certified copies of the priority documents have been received.
    - 2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_
    - Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).
  - \* Certified copies not received: \_\_\_\_\_

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.
THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

- 4. A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
- CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
  - (a) 🔲 including changes required by the Notice of Draftsperson's Patent Drawing Review ( PTO-948) attached
    - 1) I hereto or 2) to Paper No./Mail Date \_\_\_\_\_
  - (b) including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date \_\_\_\_\_.

Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).

 DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

### Attachment(s)

- 1. Notice of References Cited (PTO-892)
- Notice of Draftperson's Patent Drawing Review (PTO-948)
- Information Disclosure Statements (PTO/SB/08), Paper No./Mail Date
- Examiner's Comment Regarding Requirement for Deposit of Biological Material
- 5. Notice of Informal Patent Application
- Interview Summary (PTO-413), Paper No./Mail Date \_\_\_\_\_\_.
- 7. Examiner's Amendment/Comment
- 8.  $\boxtimes$  Examiner's Statement of Reasons for Allowance
- 9. Other \_\_\_\_\_.

Michael B. Holmes Primary Examiner Art Unit: 2129 Art Unit: 2129



### UNITED STATES PATENT AND TRADEMARK OFFICE

P.O. Box 1450, Alexandria, Virginia 22313-1450 - www.uspto.gov

## Examiner's Detailed Office Action

- Claims 1-33, 48, 74, 100, 127 & 138-157 have been canceled.
- Claims 34-47, 49-73, 75-99, 101-126 & 128-137 are allowed.

#### REASONS FOR ALLOWANCE

- 3. The following is an Examiner's statement for reasons for allowance:
- 4. Claims 34-47, 49-73, 75-99, 101-126 & 128-137 are considered allowable since when reading the claims in light of the specification, none of the references of record alone or in combination disclose or suggest the combination of limitations specified in the independent claim(s).
- 5. The limitations recited in independent claim 34 "A method of analyzing a thought system of a subject, said subject consisting of at least one individual and said method being implemented by a computing device, the method comprising the steps of: inputting a plurality of items perceived by said subject into the computing device; obtaining relationship information of all possible pairs of said items, based on perception of said subject with respect to relationship between two items of each of said all possible pairs of said items; generating a relation matrix of the plurality of items based on said relationship information of each of said items with respect to

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the all other items; generating a profile matrix by dividing each element of said relation matrix by a sum of said elements of said relation matrix; generating a transformed matrix by transforming said profile matrix based on a deviation of each element of said profile matrix from a corresponding expectation of said element of said profile matrix; transforming said transformed matrix to a display matrix projected on a representation space having dimensions lower than the number of said items and reflecting a relationship between said items perceived by said subject; and displaying said items on said representation space according to said display matrix such that said items are plotted on respective positions in said representation space and shown on an output device; wherein said step of obtaining relationship information further comprises the step of showing said subject only one pair of said all possible pairs of said items in order, for allowing said individual to assign said relationship information for each pair of said items, in the same order."

6. The limitations recited in independent claim 60 "A method of analyzing a thought system of a subject, said subject consisting of at least one individual and said method being implemented by a computing device, the method comprising the steps of: inputting a plurality of items perceived by said subject into the computing device; obtaining relationship information of all possible pairs of said items, based on perception of said subject with respect to relationship between two items of each of said all possible pairs of said items; generating a relation matrix of the plurality of items based on said relationship information of each of said items with respect to the all other items; generating a profile matrix by dividing each element of said relation matrix by a sum of said elements of said relation matrix; generating a transformed matrix by transforming said profile matrix based on a deviation of each element of said profile matrix from

a corresponding expectation of said element of said profile matrix; transforming said transformed matrix to a display matrix projected on a representation space having dimensions lower than the number of said items and reflecting a relationship between said items perceived by said subject; and displaying said items on said representation space according to said display matrix such that said items are plotted on respective positions in said representation space and shown on an output device; wherein said items perceived by said subject are qualitative data, while said relationship information are processed as quantitative data in said step of transforming said transformed matrix to said display matrix."

7. The limitations recited in independent claim 86 "A method of analyzing a thought system of a subject, said subject consisting of at least one individual and said method being implemented by a computing device, the method comprising the steps of: inputting a plurality of items perceived by said subject into a computing device; obtaining relationship information of all possible pairs of said items, based on perception of said subject with respect to relationship between two items of each of said all possible pairs of said items; generating a relation matrix of the plurality of items based on said relationship information of each of said items with respect to the all other items; generating a profile matrix by dividing each element of said relation matrix by a sum of said elements of said relation matrix; generating a transformed matrix by transforming said profile matrix based on a deviation of each element of said profile matrix from a corresponding expectation of said element of said profile matrix; transforming said transformed matrix to a display matrix projected on a representation space having dimensions lower than the number of said items and reflecting a relationship between said items perceived by said subject; and displaying said items on said representation space according to said display matrix such that

said items are plotted on respective positions in said representation space and shown on an output device; wherein said step of generating said relation matrix is arranged for generating said relation matrix by using values of said relationship information, said relationship information being assigned to each of said items for representing the relationship with respect to said all other items, and being set to respective elements of said relation matrix."

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8 The limitations recited in independent claim 112 "A method of analyzing a thought system of a subject, said subject consisting of at least one individual and being implemented by a computing device, comprising the steps of: inputting a plurality of items perceived by said subject into the computing device; obtaining relationship information of all possible pairs of said items, based on perception of said subject with respect to relationship between two items of each of said all possible pairs of said items; generating a relation matrix of the plurality of items based on said relationship information of each of said items with respect to the all other items; generating a profile matrix by dividing each element of said relation matrix by a sum of said elements of said relation matrix; generating a transformed matrix by transforming said profile matrix based on a deviation of each element of said profile matrix from a corresponding expectation of said element of said profile matrix; transforming said transformed matrix to a display matrix projected on a representation space having dimensions lower than the number of said items and reflecting a relationship between said items perceived by said subject; and displaying said items on said representation space according to said display matrix such that said items are plotted on respective positions in said representation space and shown on an output device; wherein said representation space consists of a two or three dimensional coordinate domain, and said step of displaying said items is arranged for plotting items on a corresponding

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position in said coordinate domain, according to said display matrix."

When taken in context the claim(s) as a whole, were not uncovered in the prior art.
 Moreover, the dependent claims are allowed as they depend upon an allowable independent claim(s).

- 10. A practical application for the invention is disclosed on page 46, paragraph 3:
  "Further, by only observing items plotted on the display space according to the display matrix, the subject can recognize the thoughts of his or her subconscious as a root of the perceived thought of the subject's subconscious, permitting an effective organization of his or her thought. The present method may be effectively utilized for making a decision of ideas or way of act, solving problems, mental treatments such as psychological understanding, psychological analysis and the like."
- 11. Any comments considered necessary by applicant must be submitted no later that the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments regarding Statement of Reasons for Allowance"

# Correspondence Information

12. Any inquires concerning this communication or earlier communications from the examiner should be directed to Michael B. Holmes, who may be reached Monday through Thursday, between 8:00 a.m. and 6:00 p.m. EST. or via telephone at (571) 272-3686 or facsimile transmission (571) 273-3686 or email michael.holmesb@uspto.gov.

If you need to send an Official facsimile transmission, please send it to (571) 273-8300.

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If attempts to reach the examiner are unsuccessful the Examiner's Supervisor, David Vincent, may be reached at (571) 272-3080.

Hand-delivered responses should be delivered to the Receptionist @ (Customer Service Window Randolph Building 401 Dulany Street, Alexandria, VA 22313), located on the first floor of the south side of the Randolph Building.

Finally, information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Moreover, status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <a href="http://pair-direct.uspto.gov">http://pair-direct.uspto.gov</a>. Should you have any questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) toll-free @ 1-866-217-9197.

Michael B. Holmes

Primary Examiner Artificial Intelligence Art Unit 2129 Jnited States Department of Comn

United States Department of Commerce Patent & Trademark Office

Thursday, June 19, 2008 MBH

> /Michael B. Holmes/ Primary Examiner, Art Unit 2129